UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/003,773	11/15/2001	Gregory R. Lloyd	TSQ-001RCE3	4625
	7590 03/27/200 OCKFIELD, LLP	8	EXAMINER	
ONE POST OF	FICE SQUARE		ABEL JALIL, NEVEEN	
BOSTON, MA 02109-2127			ART UNIT	PAPER NUMBER
			2165	
			MAIL DATE	DELIVERY MODE
			03/27/2008	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

	Application No.	Applicant(s)			
	10/003,773	LLOYD ET AL.			
Office Action Summary	Examiner	Art Unit			
	Neveen Abel-Jalil	2165			
The MAILING DATE of this communication app	ears on the cover sheet with the c	orrespondence address			
Period for Reply					
A SHORTENED STATUTORY PERIOD FOR REPLY WHICHEVER IS LONGER, FROM THE MAILING DA - Extensions of time may be available under the provisions of 37 CFR 1.13 after SIX (6) MONTHS from the mailing date of this communication. - If NO period for reply is specified above, the maximum statutory period w - Failure to reply within the set or extended period for reply will, by statute, Any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b).	ATE OF THIS COMMUNICATION 36(a). In no event, however, may a reply be tim vill apply and will expire SIX (6) MONTHS from cause the application to become ABANDONE	N. nely filed the mailing date of this communication. D (35 U.S.C. § 133).			
Status					
1) Responsive to communication(s) filed on 10/29	0/07				
	action is non-final.				
· <u> </u>					
closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.					
Disposition of Claims					
4)⊠ Claim(s) <u>1-5,7,8,10-24,27-31,36 and 37</u> is/are pending in the application.					
4a) Of the above claim(s) is/are withdrawn from consideration.					
5) Claim(s) is/are allowed.					
6)⊠ Claim(s) <u>1-5,7,8,10-24,27-31,36 and 37</u> is/are rejected.					
7) Claim(s) is/are objected to.					
8) Claim(s) are subject to restriction and/or	election requirement.				
Application Papers					
9)⊠ The specification is objected to by the Examine	r.				
10) ☐ The drawing(s) filed on is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.					
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).					
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).					
11)☐ The oath or declaration is objected to by the Ex	aminer. Note the attached Office	Action or form PTO-152.			
Priority under 35 U.S.C. § 119					
12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).					
a) All b) Some * c) None of:					
1. ☐ Certified copies of the priority documents have been received.2. ☐ Certified copies of the priority documents have been received in Application No					
3. Copies of the certified copies of the priority documents have been received in this National Stage					
application from the International Bureau (PCT Rule 17.2(a)).					
* See the attached detailed Office action for a list of the certified copies not received.					
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Attachment(s)					
1) Notice of References Cited (PTO-892)	4) 🔲 Interview Summary				
2) Notice of Draftsperson's Patent Drawing Review (PTO-948)	Paper No(s)/Mail Da 5) Notice of Informal P				
Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date	6) Other:	atom ripphoduori			



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DETAILED ACTION

Continued Examination Under 37 CFR 1.114

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 29-October -2007 has been entered.

2. The amendment filed on 17-October -2007 has been received and entered. Claims 1-5, 7-8, 10-24, 27-31, and 36-37 are pending.

Specification

3. The specification is objected to as failing to provide proper antecedent basis for the claimed subject matter. See 37 CFR 1.75(d)(1) and MPEP § 608.01(o). Correction of the following is required: Claim 27 and its dependence recite the term "computer readable medium" without any explicit definition in the specification.

Claim Rejections - 35 USC § 112

4. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

5. Claims 1 and 27 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

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Claim 1 and 27, between lines 4 and 5, appear to be missing essential steps disclosed in applicant's specification page 3, lines 7-8 "each entry has associated with it a metastructure containing metadata" as to make the relationship between the claimed earlier claimed recitations and the latter introduced "metastructure".

Claim 1 also appears to be missing the term "the indexed" prior to entries in line 5 which is necessarily for continuity and consistency of the claimed invention.

Although the amendment is in response to the Final office action whereby the potentially allowable subject matter was appreciatively incorporated to claims 1 and 27, the changes are confusing and create vagueness as to what is actually being claimed. Its unclear why there is three introductory mentions of "a data structure" and whether the "data structure" is different from the previously claimed "metastructure" and if so, how do they related to each other? Applicant's specification gives various examples of "data structures" on page 6, lines 1-10, leaving it difficult to ascertain which particular one is being claimed and how it related to the reminder of the clams.

For example, in claim 1, lines 19-22, the sentence is written awkwardly and thus difficult to ascertain its meaning. It is also unclear how the newly amended section now interrelates to the original claim as there is no-tie in claimed entry ID nor pervious statements regarding entry relationships. It is also unclear how "user defined part" is first being attached an label but then it is cross-indexed with other structure information. Claim 1, line 22, the recitation of "indicting" is

unclear and does not provide what is in fact being indicated"? Also, the fact, that now both claims 1 and 27 have two displaying steps making it confusing as when the second set of limitations occurs.

Claim Rejections - 35 USC § 103

- 6. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 7. Claims 1-5, 7-8, 10-24, 27-31, and 36-37 are rejected under 35 U.S.C. 103(a) as being unpatentable over Rivette et al. (U.S. Patent No. 5,806,079) in view of Ryan et al. (U.S. Patent No. 6,421,675 B1), and further in view of Davis (U.S. Patent No. 6,920,608 B1).

As to claim 1, <u>Rivette et al.</u> discloses in an electronic device, a method, comprising the steps of:

providing a plurality of entries containing data (See <u>Rivette et al.</u> Figure 3B); assigning an entry ID to each of said entries (See <u>Rivette et al.</u> column 25, lines 19-65, wherein "entry ID" reads on "identifier"),

each said entry ID being a unique value (See <u>Rivette et al.</u> column 25, lines 19-65, wherein "entry ID" reads on "identifier");

storing each entry indexed by the assigned entry ID (See <u>Rivette et al.</u> column 25, lines 19-65, wherein "entry ID" reads on "identifier");

altering the data contained in one of a selected one of the plurality of entries to create a new entry, said new entry having an entry ID assigned (See <u>Rivette et al.</u> Figure 3B, <u>Rivette et al.</u> Figure 7B, also see <u>Rivette et al.</u> column 29, lines 24-46);

cross-indexing said new entry with said selected entry (See <u>Rivette et al.</u> column 30, lines 42-65);

updating a meta structure associated with said selected entry to reflect relationship changes caused by said new entry, said updating including a time said selected entry was altered (See Rivette et al. column 30, lines 22-36); and

displaying said new entry in response to requests for said selected entry (See <u>Rivette et al.</u> column 29, lines 24-46).

Rivette et al. teaches the claimed invention but does not explicitly teach the metastructure maintaining a list of plurality of relationship changes between the selected entry and at least one other entry that show an evolution of said selected entry over a time period that includes a time period before said updating.

Ryan et al. teaches the metastructure maintaining a list of plurality of relationship changes between the selected entry and at least one other entry that show an evolution of said selected entry over a time period that includes a time period before said updating (See Ryan et al. column 29, lines 32-39, and see Ryan et al. column 29, lines 40-46, and see Ryan et al. column 17, lines 29-35, wherein table 9 is described as storing past updates -i.e. over time, and see Ryan et al. Table 9, shows original creation date/time).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to have modified <u>Rivette et al.</u> by the teaching of <u>Ryan et al.</u> to include the

metastructure maintaining a list of plurality of relationship changes between the selected entry and at least one other entry that show an evolution of said selected entry over a time period that includes a time period before said updating because it provides for it provides for accuracy of information frequently (See Ryan et al. column 2, lines 49-55);

attaching a user-provided label to a user-defined part of said selected entry, said label being cross-indexed with said user-defined part, said selected entry and with a data structure referencing other entries containing said label (See <u>Rivette et al.</u> column 7, lines 41-52, wherein "label" reads on "note").

The combined teachings of <u>Rivette et al.</u> with <u>Ryan et al.</u> teach the invention but still do not teach:

replacing said label with a replacement label that is being cross-indexed with said userdefined part, said selected entry and a data structure of other entries containing segments with said replacement label;

indicating in said data structure holding the original label the time the original label is replaced; and

displaying said replacement label with said selected entry in response to requests for earlier versions of said selected entry which originally lacked said replacement label.

<u>Davis</u> teaches replacing said label with a replacement label that is being cross-indexed with said user- defined part, said selected entry and a data structure of other entries containing segments with said replacement label (See column 41, lines 61-65, and see column 50, lines 26-48);

indicating in said data structure holding the original label the time the original label is replaced (See column 19, lines 1-6, wherein it is inherent that "original label" time must coincide with the document creation time); and

displaying said replacement label with said selected entry in response to requests for earlier versions of said selected entry which originally lacked said replacement label (See column 18, lines 39-67, and see column 21, lines 60-63, and see column 22, lines 1-12, wherein it is inherent the latest version is the currently displayed version).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to have further modified <u>Rivette et al.</u> as modified by the teaching of <u>Davis</u> to include replacing labels as versions change and keeping track of all changes made to user defined labels since it provides for more efficient and better conforming process for document publishing.

As to claim 2, <u>Rivette et al.</u> as modified discloses comprising the further steps of: parsing the data contained in said selected entry into segments (See <u>Rivette et al.</u> column 7, lines 45-65);

assigning an item ID having a unique value to each of said segments (See <u>Rivette et al.</u> column 25, lines 19-65, wherein "entry ID" reads on "identifier"); and

updating the meta structure of said selected entry to include a reference to said item IDs assigned to each of said segments (See Rivette et al. column 30, lines 22-36).

As to claim 3, Rivette et al. as modified discloses comprising the further step of:

appending the parsed data from said selected entry to a journal, said journal being a data structure located in permanent memory (See <u>Rivette et al.</u> column 9, lines 3-16).

As to claim 4, <u>Rivette et al.</u> as modified discloses comprising the further step of: parsing said selected entry into segments;

attaching a label to at least one of said segments, wherein said label is cross indexed with said segment, said selected entry and with a data structure referencing at least one other entry containing a segments with said label (See <u>Rivette et al.</u> column 7, lines 41-52, wherein "label" reads on "note").

As to claim 5, <u>Rivette et al.</u> as modified discloses comprising the further steps of: searching said plurality of entries based on said label attached to said at least one of said segments (See Rivette et al. column 25, lines 1-9); and

displaying a results of said search on a web page, the results indicating entries from said plurality of entries that contain said label attached to said at least one of said segments (See Rivette et al. column 29, lines 24-46).

As to claim 7, Rivette et al. as modified discloses comprising the further step of: displaying a web page containing only said user-defined part of said selected entry (See Rivette et al. column 36, lines 39-54).

As to claim 8, <u>Rivette et al.</u> as modified discloses searching said plurality of entries based on said label (See <u>Rivette et al.</u> column 21, lines 15-36, also see <u>Rivette et al.</u> column 27, lines 48-56); and

displaying a results of said search on a web page, wherein said web page indicates all of the entries from said plurality of entries that contain said label (See <u>Rivette et al.</u> column 21, lines 15-36, also see Rivette et al. column 27, lines 48-56).

As to claim 14, Rivette et al. a modified discloses further:

providing a permanent memory location (See <u>Rivette et al.</u> column 31, lines 4-34)

parsing the data contained within said selected entry (See Rivette et al. column 7, lines

45-65); and

storing the parsed data in a permanent memory location (See <u>Rivette et al.</u> column 31, lines 4-34).

As to claim 15, Rivette et al. as modified discloses comprising the further steps of: storing a reference to at least **one of**, another entry, an update to said selected entry, and a labeling of said selected entry, in a meta structure stored in a data structure in said permanent memory location (See Rivette et al. column 31, lines 4-34).

As to claim 16, <u>Rivette et al.</u> as modified discloses wherein said meta structure includes a grammar object, said grammar object expressing a ternary relationship among said data (See Rivette et al. column 9, lines 9-16).

As to claim 17, <u>Rivette et al.</u> as modified discloses wherein the selected entry is an email message (See <u>Rivette et al.</u> column 12, lines 65-67).

As to claim 18, <u>Rivette et al.</u> as modified discloses wherein selected entry is an attachment to an email message (See <u>Rivette et al.</u> column 32, lines 10-32).

As to claim 19, <u>Rivette et al.</u> as modified discloses wherein the selected entry is a web page (See <u>Rivette et al.</u> column 32, lines 10-32).

As to claim 20, <u>Rivette et al.</u> as modified discloses wherein the selected entry is user-input text (See <u>Rivette et al.</u> column 11, lines 12-21, wherein "entry" reads on "object").

As to claim 21, <u>Rivette et al.</u> as modified discloses wherein said electronic device is interfaced with a network (See <u>Rivette et al.</u> column 24, lines 37-44).

As to claim 22, <u>Rivette et al.</u> as modified discloses wherein the selected entry is audio data (See <u>Rivette et al.</u> column 11, lines 12-21, wherein "entry" reads on "object").

As to claim 23, <u>Rivette et al.</u> as modified discloses wherein the selected entry is video data (See <u>Rivette et al.</u> column 11, lines 12-21, wherein "entry" reads on "object").

As to claim 24, <u>Rivette et al.</u> as modified discloses wherein said selected entry is a complete document that is not segmented prior to the assignment of said entry ID (See <u>Rivette et al.</u> column 12, lines 65-67).

As to claim 27, <u>Rivette et al.</u> discloses a computer readable medium holding computerexecutable instructions that upon executing cause a computer device to:

provide a plurality of entries containing data (See <u>Rivette et al.</u> column 16, lines 7-19); assign an entry ID to each of said entries, said entry ID being a unique value (See <u>Rivette et al.</u> column 25, lines 19-65, wherein "entry ID" reads on "identifier");

store each entry indexed by the assigned entry ID (See column 25, lines 19-65, wherein "entry ID" reads on "identifier");

alter the data contained in one of a selected one of said plurality of entries to create a new entry, said new entry having an entry ID assigned, the new entry cross-indexed with said selected entry (See Rivette et al. column 29, lines 13-37, also see Rivette et al. column 30, lines 22-27);

update a meta structure associated with said selected entry to indicate a time said selected entry was altered (See <u>Rivette et al.</u> column 14, lines 35-50, also see <u>Rivette et al.</u> column 21, lines 29-36, wherein "label" reads on "notes", also see <u>Rivette et al.</u> column 25, lines 42-65, wherein "meta" reads on "descriptor"); and

display said new entry in response to requests for said selected entry (See <u>Rivette et al.</u> column 21, lines 55-61).

Rivette et al. teaches the claimed invention but does not explicitly teach the metastructure maintaining a list of plurality of relationship changes between the selected entry and at least one

other entry that show an evolution of said selected entry over a time period that includes a time period before said updating.

Ryan et al. teaches the metastructure maintaining a list of plurality of relationship changes between the selected entry and at least one other entry that show an evolution of said selected entry over a time period that includes a time period before said updating (See Ryan et al. column 29, lines 32-39, and see Ryan et al. column 29, lines 40-46, and see Ryan et al. column 17, lines 29-35, wherein table 9 is described as storing past updates -i.e. over time, and see Ryan et al. Table 9, shows original creation date/time).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to have modified Rivette et al. by the teaching of Ryan et al. to include the metastructure maintaining a list of plurality of relationship changes between the selected entry and at least one other entry that show an evolution of said selected entry over a time period that includes a time period before said updating because it provides for it provides for accuracy of information frequently (See Ryan et al. column 2, lines 49-55).

The combined teachings of <u>Rivette et al.</u> with <u>Ryan et al.</u> teach the invention but still do not teach:

replacing said label with a replacement label that is being cross-indexed with said userdefined part, said selected entry and a data structure of other entries containing segments with said replacement label;

indicating in said data structure holding the original label the time the original label is replaced; and

displaying said replacement label with said selected entry in response to requests for earlier versions of said selected entry which originally lacked said replacement label.

<u>Davis</u> teaches replacing said label with a replacement label that is being cross-indexed with said user- defined part, said selected entry and a data structure of other entries containing segments with said replacement label (See column 41, lines 61-65, and see column 50, lines 26-48);

indicating in said data structure holding the original label the time the original label is replaced (See column 19, lines 1-6, wherein it is inherent that "original label" time must coincide with the document creation time); and

displaying said replacement label with said selected entry in response to requests for earlier versions of said selected entry which originally lacked said replacement label (See column 18, lines 39-67, and see column 21, lines 60-63, and see column 22, lines 1-12, wherein it is inherent the latest version is the currently displayed version).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to have further modified <u>Rivette et al.</u> as modified by the teaching of <u>Davis</u> to include replacing labels as versions change and keeping track of all changes made to user defined labels since it provides for more efficient and better conforming process for document publishing.

As to claim 28, <u>Rivette et al.</u> as modified discloses wherein said method comprises the further steps of:

parse said selected entry into segments (See <u>Rivette et al.</u> column 25, lines 19-65, wherein "entry ID" reads on "identifier");

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assign an item ID having a unique value to each of said segments (See <u>Rivette et al.</u> column 25, lines 19-65, wherein "entry ID" reads on "identifier"); and

update the meta structure of said selected entry to include a reference to said item ID (See Rivette et al. column 25, lines 19-65, wherein "entry ID" reads on "identifier").

As to claim 29, <u>Rivette et al.</u> as modified discloses wherein said method comprises the further step of:

attach a label to at least one of said segments (See <u>Rivette et al.</u> column 3, lines 30-31, wherein "label" reads on "note"), said label cross-indexed with said segment, said selected entry and with a data structure listing other entries containing a segment with said label (See <u>Rivette et al.</u> column 21, lines 38-47).

As to claim 30, Rivette et al. as modified discloses further comprising: select a time slice to apply to a selected entry, said time slice corresponding to a period of time (See Rivette et al. column 21, lines 29-36, wherein "label" reads on "notes"); select a perspective to apply to said selected entry, said perspective being a date reference controlling which of the plurality of labels referencing said selected entry to display with said selected entry (See Rivette et al. column 30, lines 22-50); and display said selected entry constrained by said time slice and said perspective (See

As to claim 31, Rivette et al. discloses as modified further comprising:

Rivette et al. column 21, lines 29-36, wherein "label" reads on "notes").

search said plurality of entries based on said label (See <u>Rivette et al.</u> column 25, lines 1-9); and

display the results of said search in a document referencing other entries from said plurality of entries that contain said label (See <u>Rivette et al.</u> column 29, lines 24-46), each of the entries indicating a time the label became affixed to the entry (See <u>Rivette et al.</u> column 21, lines 29-36, wherein "label" reads on "notes").

As to claims 36-37, <u>Rivette et al.</u> as modified discloses wherein the selected entry is one of audio and video data (See <u>Rivette et al.</u> column 1, lines 39-42).

Response to Arguments

8. Applicant's arguments with respect to the claims have been considered but are moot in view of the new ground(s) of rejection.

Conclusion

9. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

For complete list of cited relevant art, see PTO-form 892.

10. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Neveen Abel-Jalil whose telephone number is 571-272-4074. The examiner can normally be reached on 8:30AM-5:30PM EST.

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If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Christian P. Chace can be reached on 571-272-4190. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Neveen Abel-Jalil Primary Examiner March 24, 2008 /Neveen Abel-Jalil/ Primary Examiner, Art Unit 2165